

AMENDMENT UNDER 37 C.F.R. § 1.111
U.S. Appln. No.: 10/663,845
Attorney Docket No.: Q77366

REMARKS

In the present Amendment, claim 1 has been amended to recite that the nonionic polar group in the side chain of the graft polymer chain is a hetero aromatic group having a nitrogen atom or a sulfur atom.

Claim 2 has been amended to improve its grammar.

New claims 3 and 4 have been added.

Claim 3 depends from claim 1, and recites that the heteroaromatic group is a pyridine group, a quinoline group, a thiophene group or a benzothiophene group.

Claim 4 also depends from claim 1, and recites that the heteroaromatic group is a pyridine group.

Section 112 support for the amendment may be found, for example, at page 8, lines 7-13 of the specification, and in Example 1 beginning at page 24 of the specification.

No new matter has been added and entry of the Amendment is respectfully requested.

In Paragraph No. 2 of the Action, claims 1-2 are rejected under 35 U.S.C. § 102(a), (b) or (e) as allegedly being anticipated by Kawamura et al (USP 6,566,029 or US 2002 0117066A1 or EP 1 216 831 A).

Applicants submit that this rejection should be withdrawn because the Kawamura et al documents relied upon in the present rejection do not disclose or render obvious the functional surface member of the present claims as amended.

As discussed above, independent claim 1 has been amended to recite that the nonionic polar group in the side chain of the graft polymer chain is a heteroaromatic group having a

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nitrogen atom or a sulfur atom. Two new dependent claims, reciting specific heteroaromatic groups in Markush form (claim 3) and reciting that the heteroaromatic group is a pyridine group (claim 4), have been added.

In view of the above, Applicants respectfully request reconsideration and withdrawal of the rejection set forth in Paragraph No. 2 of the Action.

In Paragraph No. 3 of the Action, claims 1-2 are rejected under 35 U.S.C. § 102(a) or (e) as allegedly being anticipated by Kawamura et al (USP 6,811,878 or US 2003 008135A1 or EP 1 271 561 A).

The Examiner states that Kawamura et al teach a conductive film comprising a support having a surface on which a graft polymer chain having a non-ionic polar group in the side chain thereof is bonded and provided thereon a layer comprising adsorbed fine metal particles ionically bonded to the polar group of the graft polymer (US '135: paragraph 0002, 0015-0016, 0034-0045, 0054-0070; EP: paragraph 0001-0003, 0013-0014, 0036-0038, 0062-0063).

Applicants submit that this rejection should be withdrawn because the Kawamura et al documents cited in Paragraph No. 3 of the Action do not disclose or render obvious the functional surface member of the present claims.

Kawamura et al USAN '135, in describing the preferred embodiments, describes a "First Aspect" (See paragraph 0024) and a "Second Aspect" (See paragraph 0053). In describing the "first aspect," Kawamura et al state that the conductive film according to the first aspect of their invention comprises a support having "ionic groups" on at least one surface thereof. See

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Kawamura et al USAN '135 at paragraph 0025. Examples of “ionic monomers” capable of forming ionic groups are described beginning at paragraph 0034, cited by the Examiner.

In describing this “First Aspect” of the invention, Kawamura go on to state that “conductive fine particles having electrical charges capable of ionically binding to the ionic groups are described hereinafter.” See Kawamura et al USAN '135 at paragraph 0038.

The “First Aspect” of the invention of Kawamura et al is different from the present invention, because the present invention calls for a graft polymer chain having a non-ionic polar group in the side chain thereof, and the claims further require that a layer comprising adsorbed fine particles capable of polarly bonding to the polar groups be provided. “Polar” bonding is different from the ionic bonding described in Kawamura et al.

Turning to the “Second Aspect” of Kawamura et al described beginning at paragraph 0053 of USAN '135, this “Second Aspect” contemplates the use of hydrophilic monomers having positive charges, negative charges, or capable of dissociating into negative charges. See USAN '135 at paragraph 0069. The description states that: “Additionally, hydrophilic monomers having a non-ionic group...may be used.” See *id.* Applicants note that these hydrophilic monomers having a non-ionic group are not even mentioned with respect to the First Aspect of Kawamura et al, and are less preferred even when used in the Second Aspect of the invention. Furthermore, there is no description of using “fine particles having electrical charges capable of ionically bonding to the ionic groups” together with the hydrophilic monomers having a non-ionic group. That is, the only aspect of Kawamura et al which appears to contemplate the use of hydrophilic monomers having a nonionic group (i.e., the “Second Aspect”) does not

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contemplate the use in combination with those monomers of fine particles capable of polarly bonding to the polar groups.

Still further, an independent basis for the patentability of new claim 4 over the Kawamura et al documents relied upon in the present rejection is that the pyridine group called for in claim 4 is hydrophobic.

For all of these reasons, Applicants submit that the rejection set forth in Paragraph No. 3 of the Action should be reconsidered and withdrawn.

Allowance is respectfully requested.

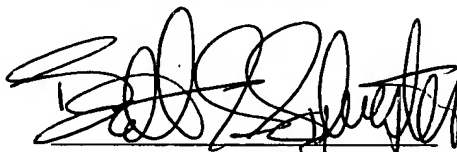
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CUSTOMER NUMBER

Respectfully submitted,

A handwritten signature in black ink, appearing to read "Brett S. Sylvester", written over a horizontal line.

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